Pluristem Granted European Patent for Use of Cells to Help Treat Damaged Bone Marrow

Patent also addresses Pluristem's three dimensional culturing technology

HAIFA, ISRAEL, May 6, 2015 -- Pluristem Therapeutics Inc. (NasdaqCM: PSTI; TASE: PLTR), a leading developer of placenta-based cell therapy products, announced today that it has been issued Patent No. EP2366775B1, titled "Methods for Cell Expansion and Uses of Cells and Conditioned Media Produced Thereby for Therapy", by the European Patent Office. This patent addresses use of adherent stromal cells from placenta or adipose tissue, expanded according to Pluristem's methods of three dimensional culturing, for treating conditions that may benefit from facilitation of hematopoietic stem cell engraftment. As described in the patent, Pluristem's therapeutic cells are designed to promote the success of hematopoietic stem cell transplantation, which is used to treat patients with dysfunctional bone marrow. The damage to the bone marrow could be due to chemotherapy or exposure to high levels of radiation, such as can occur as part of treatment for certain cancers or in a nuclear catastrophe.

Successful facilitation of hematopoietic stem cell engraftment is demonstrated by an increase in the number of bone marrow cells that are responsible for producing the cells which circulate in the blood (white blood cells, red blood cells and platelets). These circulating cells are required to resist infection, transport oxygen within the body, and prevent hemorrhage.

"This patent strengthens our position in the hematologic space, and will support an anticipated clinical program for our PLX-R18 cells in the treatment of damaged bone marrow. Since damage to bone marrow can result from a range of illnesses and exposures, we hope that our product will be able to benefit many patients suffering from hard-to-treat conditions," stated Pluristem CEO Zami Aberman. To date, Pluristem has been issued over 35 patents, and has approximately 150 more patents pending worldwide.

About Pluristem Therapeutics

Pluristem Therapeutics Inc. is a leading developer of placenta-based cell therapy products. The Company's patented PLX (PLacental eXpanded) cells release a cocktail of therapeutic proteins in response to inflammation, ischemia, hematological disorders, and radiation damage. PLX cells are grown using the Company's proprietary three-

dimensional expansion technology and are an "off-the-shelf" product that requires no tissue matching prior to administration.

Pluristem has a strong intellectual property position, Company-owned, GMP-certified manufacturing and research facilities, strategic relationships with major research institutions and a seasoned management team. For more information visit www.pluristem.com, the content of which is not part of this press release.

Safe Harbor Statement

This press release contains forward-looking statements within the meaning of the "safe harbor" provisions of the Private Securities Litigation Reform Act of 1995 and federal securities laws. . For example, forward-looking statements are used in this press release when we discuss our plan to begin clinical trials of our PLX-R18 cells for help with treatment of damaged bone marrow, and our hope that our product will be able to benefit many patients suffering from hard-to-treat conditions. These forward-looking statements and their implications are based on the current expectations of the management of Pluristem only, and are subject to a number of factors and uncertainties that could cause actual results to differ materially from those described in the forward-looking statements. The following factors, among others, could cause actual results to differ materially from those described in the forward-looking statements: changes in technology and market requirements; we may encounter delays or obstacles in launching and/or successfully completing our clinical trials; our products may not be approved by regulatory agencies, our technology may not be validated as we progress further and our methods may not be accepted by the scientific community; we may be unable to retain or attract key employees whose knowledge is essential to the development of our products; unforeseen scientific difficulties may develop with our process; our products may wind up being more expensive than we anticipate; results in the laboratory may not translate to equally good results in real surgical settings; results of preclinical studies may not correlate with the results of human clinical trials; our patents may not be sufficient; our products may harm recipients; changes in legislation; inability to timely develop and introduce new technologies, products and applications; loss of market share and pressure on pricing resulting from competition, which could cause the actual results or performance of Pluristem to differ materially from those contemplated in such forward-looking statements. Except as otherwise required by law, Pluristem undertakes no obligation to publicly release any revisions to these forward-looking statements to reflect events or circumstances after the date hereof or to reflect the occurrence of unanticipated events. For a more detailed description of the risks and uncertainties affecting Pluristem, reference is made to Pluristem's reports filed from time to time with the Securities and Exchange Commission.

Contact:

Pluristem Therapeutics Inc.:

Karine Kleinhaus, MD, MPH
Divisional VP, North America
1-914-512-4109
karinek@pluristem.com